TAXONOMIC AND NOMENCLATURAL NOTES ON *VACCINIUM* L. SECTION *CYANOCOCCUS* (ERICACEAE)

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ABSTRACT

Vaccinium simulatum Small is lectotypified, author citation for *V. atrococcum* Heller is corrected, and the type locality of *V. corymbosum* is restricted.

In studying the genus *Vaccinium* L. (Ericaceae) in Virginia and West Virginia, the following taxonomic and nomenclatural details were discovered which seem expedient to publish in advance of the regional treatments.

1. VACCINIUM SIMULATUM Small, Fl. Southeastern U.S. 896, 1336. 1903. SYNTYPES: KENTUCKY. Harlan Co.: Big Black Mountain, Aug 1893, *Kearney s.n.* (LECTOTYPE, here designated, NY, photo neg. no. 11894 NY!). VIRGINIA. Grayson Co.: slopes of White Top Mountain, alt. 4500 ft., 20 May 1892, *Britton, Britton*, and *Vail s.n.*, (NY, photo neg. no. 11892 NY!).

The lectotype is a fruiting specimen, the paratype is a specimen just past anthesis. The corollas of sect. *Cyanococcus* A. Gray are of limited taxonomic usefulness, whereas the berry of this species is distinctive: shining purple-black, spherical, very juicy, tart. For this reason, the fruiting specimen was selected for the lectotype.

In describing *Vaccinium simulatum* from two dried specimens collected by others, Small gave flawed measurements for corolla (3.5 – 4.5 mm long) and berry (5 – 7 mm in diameter). In life, the cylindro-campanulate corolla is 5 – 6 mm long, and the berry 6 – 10 mm in diameter. Small also said the berry is "somewhat glaucous." I have visited the type locality where the species is still abundant and observed the berries are shining purple-black. A topotype specimen (*L.J. Uttal 13848*) in fruit is deposited in VPI, and it is planned for duplicates to be sent to NY, FLAS, GH, and NCU. On drying, the berries took on a bluish cast, as black berries of other *Vaccinium* species (i.e., *Vaccinium fuscatum* Ait.) sometimes do, which presumably caused Small to misinterpret the berry color. In case of a flawed description, the name is based upon the type specimen, bolstered in this case by topotypes. Occasional glaucous-berried specimens attributed to *Vaccinium*

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simulatum may be attributed to introgression with *Vaccinium corymbosum* L. and *Vaccinium pallidum* Ait. In hybrid populations, fruit color may vary from purple-black to glaucous. *Vaccinium simulatum* is indigenous to the Cumberland Plateau, Cumberland Mountains, and middle elevations in the southern Appalachian, from southwest Virginia, eastern Kentucky, eastern Tennessee, western North Carolina and northern Georgia, at elevations from 250 to 1200 meters. It is a forest shrub of loamy soils of ridges and slopes, apparently more mesophytic than most highbush crown-forming species of sect. *Cyanococcus*. It is usually associated with maple forests (*Acer rubrum* L. or *A. saccharum* Marsh.), often with yellow birch, *Betula alleghaniensis* Britt., *Hydrangia arborescens* L., and *Kalmia latifolia* L. The forb *Asclepias exaltata* L. is a very frequent edaphic partner of this species. For more detailed discussion of this species see Camp (1945).

2. Vaccinium atrococcum Heller—correct author citation. *Vaccinium atrococcum* Heller, Bull. Torrey Bot. Club 21:24. 1894.

Vaccinium corymbosum var. *atrocarpum* Gray, Man. ed. 2. 250. 1856.
Vaccinium corymbosum var. *atrococcum* Gray, Man. rev. ed. 250. 1857.

Correctly cited by Camp (1945), but ignored, the citation usually being *Vaccinium atrococcum* (Gray) Heller for almost a century. Even if Heller intended a recombination, he made an inadvertent species designation by not using the basionym, var. *atrocarpum*.

This name is considered synonymous with *Vaccinium fuscatum* Ait. *fide* Ward (1974).

3. Vaccinium corymbosum L.—type locality.

Vaccinium corymbosum L., Sp. Pl. 1:350. 1753 (lectotype: *Kalm s.n.*, "North America," LINN, microfiche no. 497.6!). The type sheet of *Vaccinium corymbosum* bears two elements: (1) a leafy summer branch and (2) a spring branch in anthesis, just leafing out. Vander Kloet (1980) lectotypified the name by the second element, which he described.

Pehr Kalm resided in Raccoon (now Swedesboro), Gloucester County, New Jersey, in the springs of 1749 and 1750 (Benson, 1937). The lectotypified specimen is in the condition one would expect in May in New Jersey. The summer specimen was obtained either in Canada in 1749 or in western Pennsylvania or western New York in 1750. It thus seems safe to restrict the type locality of *V. corymbosum* to the vicinity of Swedesboro, Gloucester County, New Jersey, May 1749 or 1750. This restriction of type locality is considered important because the lectotype is of a morphology common in the northeastern United States and adjacent Canada, not found in the southern states except in the mountains, a point to be considered by

students of the taxonomy of the highbush species of *Cyanococcus* of the southeastern United States.

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